

DETAILED ACTION

Response to Amendment

1. Applicant's amendments, filed 1/22/2008, have been fully considered and reviewed by the examiner. The examiner notes the amendments to claim 1 and claims 1-11 remain pending in the instant application.

Response to Arguments

2. Applicant's arguments see Remarks, filed 1/22/2008, with respect to the combination of Sandaresan, Bedair, Faraone, and Molsa, see page 6-8 of Remarks. have been fully considered and are persuasive. The 103(a) rejection of claims 1-11 has been withdrawn. Specifically, after considering the art of record and the arguments set forth by the applicant, the applicants reasoning has been deemed persuasive. Specifically, Bedair discloses ALD of silicon by Si source and reducing gas, but fails to disclose oxidization of each layer as required by the claim, and one of ordinary skill in the art would not reasonably expect predictability in oxidizing each monolayer and thereafter supplying a silicon precursor, as required for silicon ALD deposition, to successfully or predictably adsorb on the surface of the silicon dioxide to start the next cycle of the plurality of silicon dioxide layers. Bedair discloses silicon precursor absorbing on the previous silicon layer and the claimed process required silicon precursor adsorbing on the prior deposited silicon dioxide layer, one skilled in the art at the time of the invention would not have reasonable expect to successfully or predictably adsorb the silicon precursor on the surface of the silicon dioxide layer. See

additionally, Nakamura, which explicitly discloses a specific gas sequence for a three precursor ALD process.

EXAMINER'S AMENDMENT

3. An examiner's amendment to the record appears below. Should the changes and/or additions be unacceptable to applicant, an amendment may be filed as provided by 37 CFR 1.312. To ensure consideration of such an amendment, it **MUST** be submitted no later than the payment of the issue fee.

Authorization for this examiner's amendment was given in a telephone interview with Andrew Merickel on 4/14/2008.

The application has been amended as follows:

IN THE CLAIMS

Please Cancel Claims 8-11

Allowable Subject Matter

4. Claims 1-7 are allowed.
5. The following is an examiner's statement of reasons for allowance: These claims are allowed substantially for the reasons set forth in applicants Remarks dated 1/22/2008, in combination with the examiner statements in paragraph 2 above.

Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably

accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to DAVID TUROCY whose telephone number is (571)272-2940. The examiner can normally be reached on Monday-Friday 8:30-6:00, No 2nd Friday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Timothy Meeks can be reached on (571) 272-1423. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/David Turocy/

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Examiner, Art Unit 1792

/Timothy H Meeks/
Supervisory Patent Examiner, Art Unit 1792